ABSTRACT

Methods and systems for automatically verifying a hardware design based on a hardware specification document are disclosed. A plurality of predefined elements can be designed within a hardware specification document, wherein the hardware specification document provides a hardware design for a hardware device. The plurality of predefined elements can be stored within a database of hardware components, wherein each predefined element of the plurality of predefined elements is associated with a hardware component of the hardware device. Physical components of the hardware device can be compared with the predefined elements maintained within the database of hardware components upon an initial power-up of the hardware device in order to verify that the hardware device functions according to the hardware specification document.